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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/845,990	04/30/2001	John L. Levenda	38190/209224	2934
826	7590 01/21/2004		EXAMINER	
ALSTON & BIRD LLP			BOYD, JENNIFER A	
BANK OF AMERICA PLAZA 101 SOUTH TRYON STREET, SUITE 4000		4000	ART UNIT	PAPER NUMBER
CHARLOTTI	E, NC 28280-4000		1771	-

DATE MAILED: 01/21/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

		Application No.	Applicant(s)			
		09/845,990	LEVENDA, JOHN L.			
	Office Action Summary	Examiner	Art Unit			
		Jennifer A Boyd	1771			
	The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply					
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).  - Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).						
Status	Responsive to communication(s) filed on <u>06</u> 0	October 2003:				
·	<u> </u>	s action is non-final.				
	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.					
Disposition of Claims						
4)🖂	4)⊠ Claim(s) <u>1 – 10, 12, 17, 19 – 22 and 24</u> is/are pending in the application.					
<ul> <li>4a) Of the above claim(s) is/are withdrawn from consideration.</li> <li>5) ☐ Claim(s) is/are allowed.</li> <li>6) ☒ Claim(s) 1 - 10, 12, 17, 19 - 22 and 24 is/are rejected.</li> <li>7) ☐ Claim(s) is/are objected to.</li> <li>8) ☐ Claim(s) are subject to restriction and/or election requirement.</li> </ul>						
	ion Papers	•				
9) The specification is objected to by the Examiner.  10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.  Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.						
Priority under 35 U.S.C. §§ 119 and 120						
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  a) All b) Some * c) None of:  1. Certified copies of the priority documents have been received.  2. Certified copies of the priority documents have been received in Application No.  3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  * See the attached detailed Office action for a list of the certified copies not received.  13) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet.  37 CFR 1.78.  a) The translation of the foreign language provisional application has been received.  14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.						
Attachment(s)						
2) D Notic	te of References Cited (PTO-892) te of Draftsperson's Patent Drawing Review (PTO-948) mation Disclosure Statement(s) (PTO-1449) Paper No(s)	5) 🔲 Notice of Informal F	(PTO-413) Paper No(s) Patent Application (PTO-152)			

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#### **DETAILED ACTION**

### Response to Amendment

- 1. The Applicant's Amendments and Accompanying Remarks, filed October 6, 2003, have been entered and have been carefully considered. Claims 13 16 have been cancelled in view of the restriction requirement, claims 1, 17 and 24 are amended, claims 11, 18 and 23 are cancelled and claims 1 10, 12, 17, 19 22 and 24 are pending. In view of Applicant's Amendment, the Examiner withdraws the 35 U.S.C. 112, 2<sup>nd</sup> paragraph rejection of claims 1 12 as set forth in paragraphs 2 3 of the previous Office Action dated July 18, 2003. In view of Applicant's Amendments, the Examiner withdraws the 35 U.S.C. 102(b) rejection of claims 17 18, 20, 22 and 24 as being anticipated by Gleim (US 5,976,671) as set forth in the previous Office Action dated July 18, 2003. Despite these advances, the invention as currently claimed is not found to be patentable for reasons herein below.
- 2. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

## Claim Rejections - 35 USC § 103

3. Claims 1 – 10, 12, 17, 19 – 22 and 24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Gleim (US 5,976,671) in view of Hirosaki (JP 05-254050).

Gleim is directed to a decorative laminate used for commercial aircraft interiors (column 1, lines 10 - 11).

As to claims 1, 2, 17 and 20, Gleim teaches a decorative laminate (See Figure 3). The

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printed laminate (40) comprises a textured layer (32), a structural layer (34), adhesive containing layer (36), printed layer (42) and capping layer (44). The textured layer, or "embossable layer", is comprised of a melt processable thermoplastic material which can adopt texture imparted by a texture media (column 5, lines 12 – 16). The textured layer can be colored and include pigmented particles (column 5, lines 42 – 45). The printed layer, or "ink layer", can include ink or toner. The capping layer, or "partially transparent layer", is comprised of a thermoplastic fluorinated polymer film (column 6, lines 10 – 27). The capping layer can be made of a clear PVDF film such as Avimark C40 and C70 (column 6, lines 23 – 27). Gleim teaches that the structural layer, or "substrate layer", can be a PVF (polyvinyl fluoride) layer (column 8, lines 55 – 57).

As to claims 3, 4 and 18, Gleim teaches that the ink or toner in the printed layer is deposited on the textured layer by a screen, electrostatic transfer, ink jet and gravure processes (column 6, lines 15 - 20), therefore, the textured layer will have at least one same color as found in the "ink layer". Gleim teaches that the textured layer can also be colored and include pigmented particles (column 5, lines 42 - 45).

As to claims 6-7, Gleim teaches that the textured layer, or "embossable layer", ranges in thickness from about 1 mil to about 5 mil (column 5, lines 35-38).

As to claims 8-9, Gleim teaches that the capping layer, or "protective layer", has a thickness ranging from 0.4 mils to 1.0 mils (column 6, lines 23-25).

As to claims 10 and 22, Gleim teaches that the textured layer, or "embossable layer", can include polyurethane (column 5, lines 29 - 30).

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As to claims 12 and 24, Gleim teaches that the thermoplastic fluorinated polymer film is PVF (polyvinyl fluoride) or PVDF (polyvinylidene fluoride) (column 6, lines 10 - 27).

As to claims 1, 5, 17 and 21, Gleim fails to teach that the structural layer, or "substrate layer", can further comprise a woven material. Gleim fails to teach that the woven material is made from glass, aramid, carbon or Kevlar fibers.

Hirosaki is directed to a lightweight decorative panel used for the interior wall panels of airplanes (page 1, [0001]). Hirosaki teaches a laminate comprising a pigmented surface decorative layer attached to a woven prepreg (Abstract). Hirosaki teaches that the woven prepreg comprises glass, Kevlar or carbon fibers (page 4, [0016]).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use the woven prepreg of Hirosaki as the structural layer, or "substrate layer", in the laminate of Gleim to create a durable and high in strength laminate with high temperature resistance.

## Response to Arguments

4. Applicant's arguments with respect to claims 1 – 10, 12, 17, 19 – 22 and 24 filed October 6, 2003 have been fully considered but they are not persuasive.

In response to Applicant's Arguments that the inclusion of a woven material bound within a resin matrix as the substrate layer would materially affect the basic and novel characteristics of the material, the Examiner respectfully argues the contrary. The Applicant has stated that the inclusion of a woven material bound within a resin matrix as the substrate layer

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would materially affect the basic and novel characteristics but has not indicated how the inclusion of the resin matrix would materially affect the basic and novel characteristics. The Applicant has noted in the Response that the preferred substrate of the invention is one in which a woven material is not bound within a resin matrix, contrary to the prepreg taught by Hirosaki. However, the Applicant further notes in the Specification that "a fiber reinforced resinous material may be used as a substrate in accordance with this invention" (page 9, lines 6 – 8 of the Specification). Given this evidence of suitability, the Examiner believes that a resin-reinforced woven material would not affect the basic and novel characteristics of the invention as perceived by the Applicant. The Examiner shifts the burden to the Applicant to support why such an embodiment would materially affect the basic and novel characteristics.

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#### Conclusion

5. THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jennifer A Boyd whose telephone number is 571-272-1473. The examiner can normally be reached on Monday thru Friday (8:30am - 6:00pm).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Terrel Morris can be reached on 571-272-1478. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 571-272-0994.

Jennifer Boyd January 4, 2004

SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 1700